



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/082,513	02/25/2002	Timothy S. McAbee	1739A1	3006

23342 7590 03/15/2004

KILPATRICK STOCKTON LLP
1001 WEST FOURTH STREET
WINSTON-SALEM, NC 27101

EXAMINER

CHOI, STEPHEN

ART UNIT	PAPER NUMBER
----------	--------------

3724

DATE MAILED: 03/15/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/082,513

Applicant(s)

MCABEE ET AL.

Examiner

Stephen Choi

Art Unit

3724

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 12 December 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) 16-20 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-15 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date <u>10</u> . | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1-7 and 12-13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Cote (US 6,360,640) in view of Green (US 4,512,225).

Cote discloses the invention substantially as claimed except for a sensor system. Green teaches a sensor system (36). It would have been obvious to one having ordinary skill in the art at the time the invention was made to employ the sensor system as taught by Green on the device of Cote in order to provide real time control of rolls to obtain accurate cutting. Regarding claim 2, the sensor system of Green senses rotational position. Regarding claims 3-7 and 13, see col. 3-4 of Green.

3. Claims 8-9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Cote (US 6,360,640) in view of Green (US 4,512,225) as applied to claim 1 above, and further in view of Applicant Admitted Prior Art (hereafter AAPA).

The modified device of Cote discloses the invention substantially as claimed except for a plurality of slots. AAPA discloses slots are old and well known in the art. It would have been obvious to one having ordinary skill in the art at the time the invention was made to employ slots as taught by AAPA on the modified device of Cote as an alternative counter structure.

Art Unit: 3724

4. Claims 10-11 and 14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Cote (US 6,360,640) in view of Green (US 4,512,225) as applied to claim 1 above, and further in view of Okahashi (US 5,720,210).

The modified device of Cote discloses the invention substantially as claimed except for the sensor system further operable to measure a radial spacing and the drive system further operable to adjust the radial spacing. Okahashi discloses a sensor system having a sensor (29, 30) for sensing a radial spacing and a drive system for adjusting the radial spacing (34). It would have been obvious to one having ordinary skill in the art at the time the invention was made to employ a radial spacing controlling mechanism as taught by Okahashi on the modified device of Cote in order to maintain correct radial spacing to reduce deterioration and wear of severing structures.

5. Claim 15 is rejected under 35 U.S.C. 103(a) as being unpatentable over Cote (US 6,360,640) in view of Green (US 4,512,225) and Okahashi (US 5,720,210).

Cote discloses the invention substantially as claimed except for a sensor system and a drive system as claimed. Green teaches a sensor system (36) as claimed except for the sensor system further operable to measure a radial spacing and the drive system further operable to adjust the radial spacing. Okahashi discloses a sensor system having a sensor (29, 30) for sensing a radial spacing and a drive system for adjusting the radial spacing (34). It would have been obvious to one having ordinary skill in the art at the time the invention was made to employ the sensor system as taught by Green and the radial spacing controlling mechanism as taught by Okahashi on the device of Cote in order to provide real time control of rolls to obtain accurate cutting while

Art Unit: 3724

maintaining correct radial spacing to reduce deterioration and wear of severing structures.

Response to Arguments

6. Applicant's arguments filed 12 December 2003 have been fully considered but they are not persuasive.

Regarding claims 1 and 12, applicants contend that neither Cote nor Green teach or suggest a sensor system operable to make measurements and generate current signals representative of at least one actual current roll property of the first roll and at least one actual current roll property of the second roll since Cote does not disclose a sensor system and Green only teaches measuring the distance of travel of knife on one of knife cylinders because the knife cylinders are interlocked. Applicants further contend that neither Cote nor Green teach or suggest a control system as claimed.

The examiner respectfully disagrees. Although Green teaches the sensor system measuring actual current roll property of only one of the rolls since the rolls are interlocked, one of ordinary skill in the art would have been motivated to provide the sensor system measuring current roll property of both rolls on the device of Cote since Cote teaches a system operating the rolls independently using a control system generating velocity profile that enables the rolls to cut the workpiece at the desired length and the proposed modification would only have involved mere duplication of the essential working parts of a device which is routine skill in the art. Furthermore, although Cote does not explicitly disclose a sensor system and a control system receiving signals from the sensor system, the device of Cote inherently has a

Art Unit: 3724

mechanism that recognizes the velocity of the rolls in order to set a desired velocity of the rolls by a control mechanism such that the control system on the modified device of Cote would behave as recited in claims 1 and 12.

Applicant's arguments, see page 25, lines 12-14, filed 12 December 2003, with respect to claim 15 have been fully considered and are persuasive. The rejection of claim 15 has been withdrawn. Although it should have been clear from the previous office action that the examiner intended to reject claim 15 in view of Cote, Green, and Okahashi similar to the rejection on paragraph 6 of the previous office action since claims 10-11 and 14 recite limitations related to the substantially same subject matter, the examiner inadvertently rejected claim 15 in view of Cote and Green instead. Hence, this office action is made Non-Final.

Regarding claims 8-9, applicants contend that Cote is directed to methods and systems of cutting ribbons which does not relate to AAPA.

The examiner respectfully disagrees. Cote discloses an apparatus for cutting an elongate workpiece which is in the field of applicant's endeavor. It is noted that a recitation with respect to the manner in which a claimed apparatus is intended to be employed does not differentiate the claimed apparatus from a prior art apparatus satisfying the claimed structural limitations.

Regarding claims 10-11 and 14, see the examiner's response with respect to claims 1 and 12 set forth above.

Conclusion


7. This action is made Non-Final.

Art Unit: 3724

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to S. Choi whose telephone number is 703-306-4523. The examiner can normally be reached on Monday thru Friday between 9am and 5pm. If attempts to reach the examiner are unsuccessful, the examiner's supervisor, Allan Shoap can be reached on 703-308-1082.

In lieu of mailing, it is encouraged that all formal responses be faxed to 703-872-9306. Any inquiry of a general nature or relating to the status of this application should be directed to the receptionist whose telephone number is 703-308-1148.

SC
March 12, 2004


STEPHEN CHOI
PRIMARY EXAMINER